

# Flexer™ Epoxy Flexibilizer

## Epoxy Resin Flexibilizing Fluid



www.smooth-on.com

### PRODUCT OVERVIEW

Flexer™ Epoxy Flexibilizer is a clear, low viscosity liquid additive that will lower the durometer (Shore hardness) of some Smooth-On casting and laminating epoxies. When added to the epoxy system in the proper proportion, the cured epoxy will be softer and, in some cases, can be made semi-rigid. Flexer™ will lower the viscosity of the epoxy system, improves wetting capability (for laminating) and filler load capacity.

	% of Flexer™ Added To Part A	Pot Life (Minutes)	Shore D Hardness After 48 Hours	Shore D Hardness After 7 Days
<b>EpoxAmite™ 100 101 Hardener</b>	0 %	11	82	84
	5 %	18	80	80
	10 %	25	77	77
	15 %	30	75	75
	20 %	40	70	70
<b>EpoxAmite™ 100 102 Hardener</b>	0 %	22	80	80
	5 %	60	78	78
	10 %	120	76	76
	15 %	135	72	73
	20 %	150	65	70
<b>EpoxAcast™ 650 101 Hardener</b>	0 %	20	90	95
	5 %	60	90	90
	10 %	180	85	85
	15 %	210	75	77
	20 %	270	70	70
<b>EpoxAcast™ 655 101 Hardener</b>	0 %	30	90	90
	5 %	60	85	85
	10 %	120	83	83
	15 %	150	70	70
	20 %	300	60	65
<b>EpoxAcast™ 690</b>	0 %	300	75	80
	5 %	420	65	75
	10 %	570	50	65
	15 % *	720	40	55
	20 % *	1260	25	35

\*Cured EpoxAcast™ 690 will remain tacky (sticky to the touch) for 48 hours or more depending on casting mass and thickness.

Usage instructions on reverse side →

## PREPARATION...

Read and follow directions given on the technical bulletin for the EpoxAcast™ or EpoxAmite™ product before adding Flexer™.

Store and use all materials at 73°F/23°C. Avoid breathing fumes - use in a well ventilated area at minimum. NIOSH approved respirator is recommended. Wear safety glasses, long sleeves and rubber gloves to minimize skin contact.

## MEASURING AND MIXING...

Flexer™ Epoxy Flexibilizer is added by weight as a percentage of Part A. An accurate gram scale is required. Add Flexibilizer to Part A of the epoxy system and mix thoroughly. Add the appropriate amount of Part B and mix all components thoroughly.

### Example:

**Goal** – Soften EpoxAcast 650 from a Shore 90D to a Shore 77D. **Normal mix ratio:** 100A:12B

EpoxAcast™ 650 Part A	+	Flexer™ Flexibilizer	Mix Thoroughly	+	EpoxAcast™ 650 Part B	Mix Thoroughly	Pour & Let Cure
1,000 grams		150 grams	-		120 grams	-	-

**Important:** Working time and cure time will be increased in proportion to the amount of Flexibilizer added. Physical and performance properties (including Shore hardness) of cured epoxy system may be lower in proportion to the amount of Flexer™ added. Do not exceed recommended loading maximum of 20% of epoxy Part A, as the epoxy system may not cure.

Because no two applications are quite the same, a small test application to determine suitability is recommended if performance of this material is in question.

### Safety First!

The material safety data sheet (MSDS) for this or any Smooth-On product should be read before using and is available on request or on our website at [www.smooth-on.com](http://www.smooth-on.com). All Smooth-On products are safe to use if directions are read and followed carefully.

**Keep Out of Reach Of Children.**

**IMPORTANT** - The information contained in this bulletin is considered accurate. However, no warranty is expressed or implied regarding the accuracy of the data, the results to be obtained from the use thereof, or that any such use will not infringe a copyright or patent. User shall determine suitability of the product for the intended application and assume all associated risks and liability.



**Call Us Anytime With Questions About Your Application.**

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[www.smooth-on.com](http://www.smooth-on.com) is loaded with information about mold making, casting and more.